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Chiang

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(54) **SYSTEMS AND METHODS FOR IMPROVED CALL HANDLING**

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See application file for complete search history.

(71) Applicant: **T-Mobile USA, Inc.**, Bellevue, WA
(US)

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(72) Inventor: **Hsin-Fu Henry Chiang**, Bellevue, WA
(US)

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(73) Assignee: **T-Mobile USA, Inc.**, Bellevue, WA
(US)

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U.S.C. 154(b) by 0 days.

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Inventor #1, "User Customizable Handling of Multiple Calls", 12
pages.

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H04B 15/00 (2006.01)

Primary Examiner — Lee Nguyen

(74) *Attorney, Agent, or Firm* — Lee & Hayes, PLLC

(52) **U.S. Cl.**

CPC **H04M 1/72583** (2013.01); **G06F 3/0482**

(2013.01); **G06F 3/0483** (2013.01); **G06F**

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H04M 3/436 (2013.01); **H04M 7/0042**

(2013.01)

(57) **ABSTRACT**

Systems and methods for providing a customizable call handling. The system can include a customizable graphical user interfaces (GUIs) to enable users to reject calls, accept calls, send a customized text message, or place calls on hold when handling one or more incoming calls. The system can enable the user to choose between multiple tabs for call handling. The system can also enable the user to customize where certain features appear in the GUI, including a customizable home screen for frequently user features. The system can enable customized text messaging to differentiate between customers or to differentiate between business and personal contacts. The system can also include machine learning algorithms to customize the GUI based on user's previous actions.

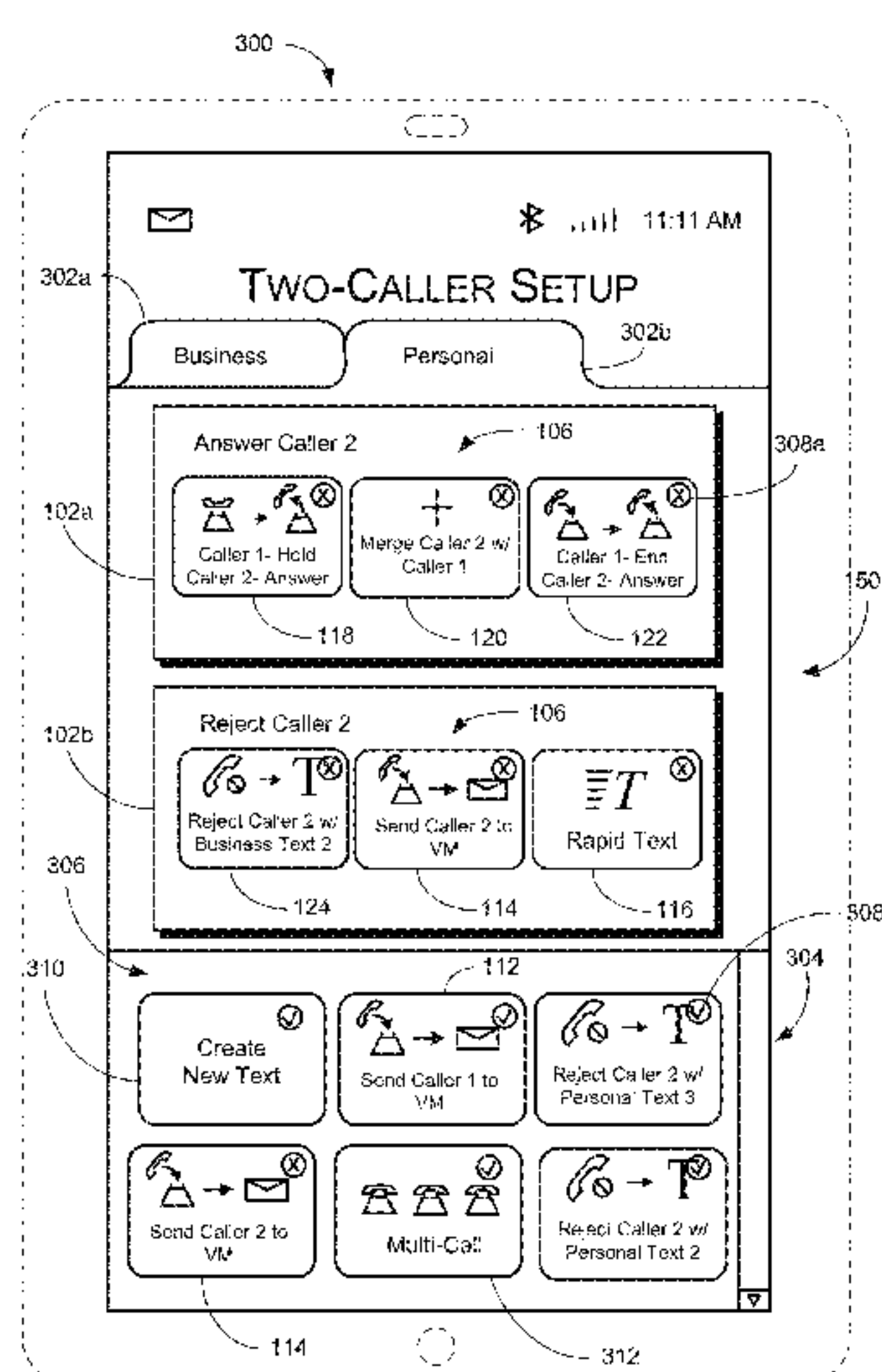
(58) **Field of Classification Search**

CPC H04M 1/72583; H04M 7/0042; H04M
3/436; G06F 3/0482; G06F 3/0483; G06F

3/0484; G06F 9/4443

USPC 455/414.1, 416, 417, 566, 567;

20 Claims, 10 Drawing Sheets



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Fig. 1A

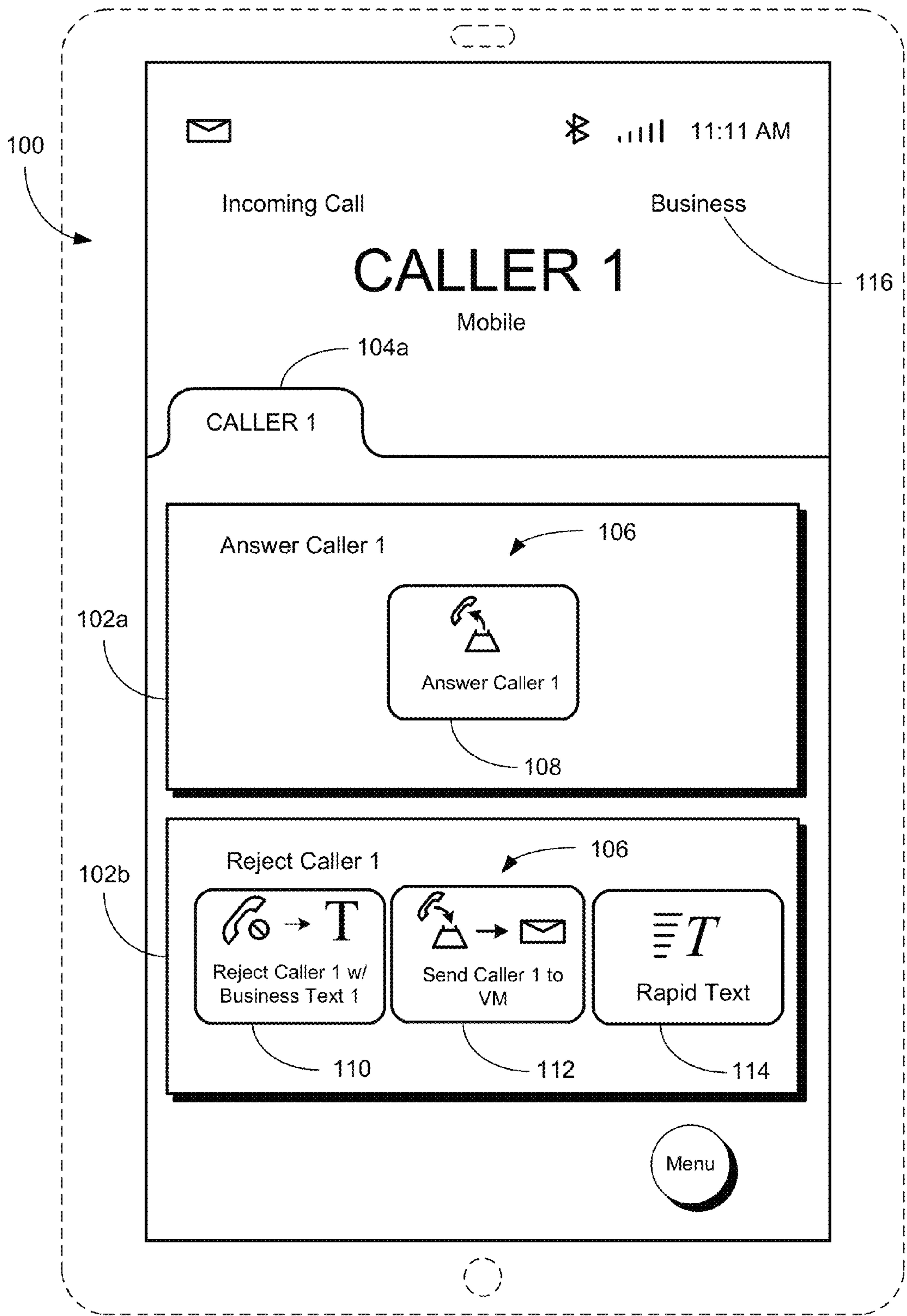


Fig. 1B

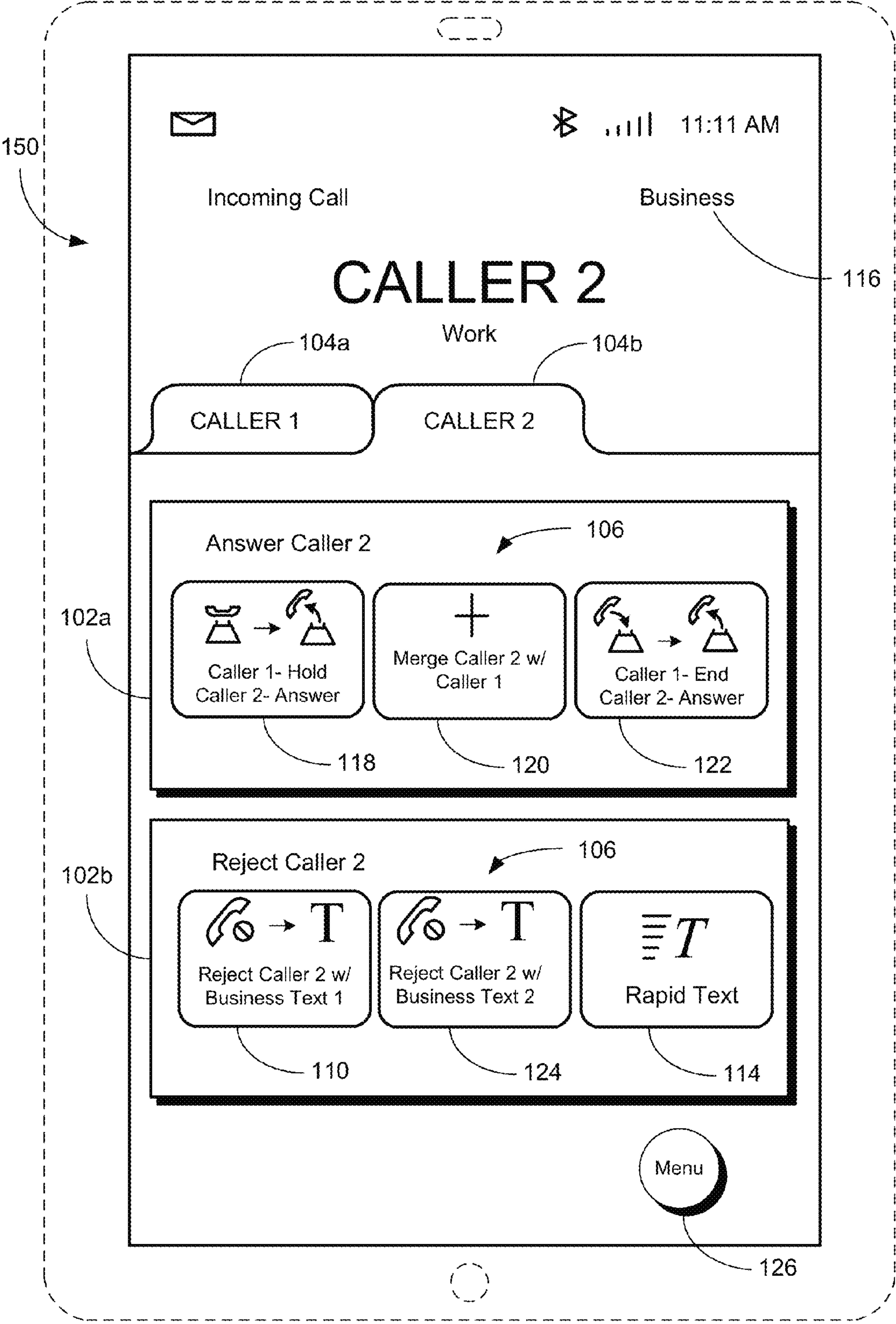


Fig. 2

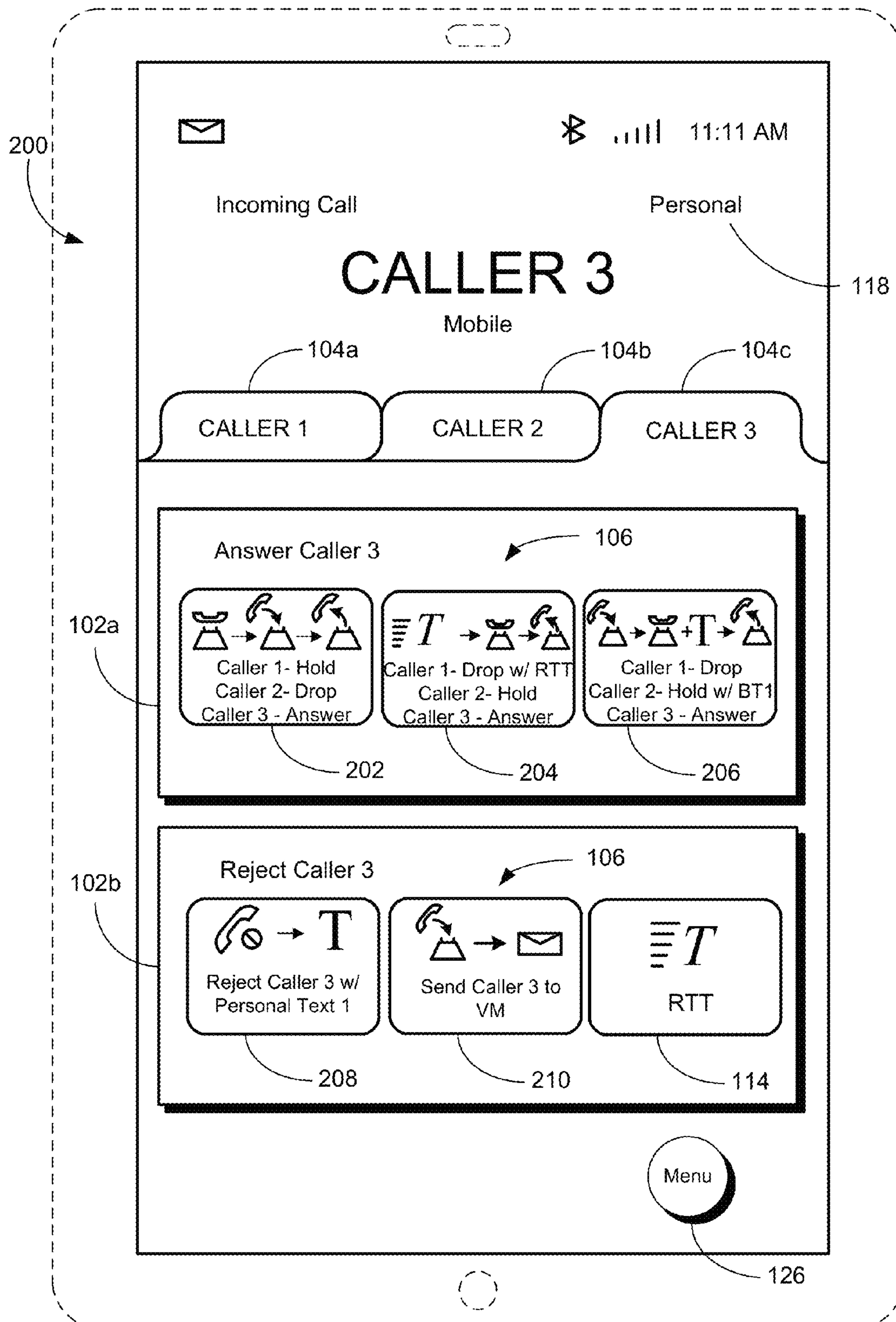


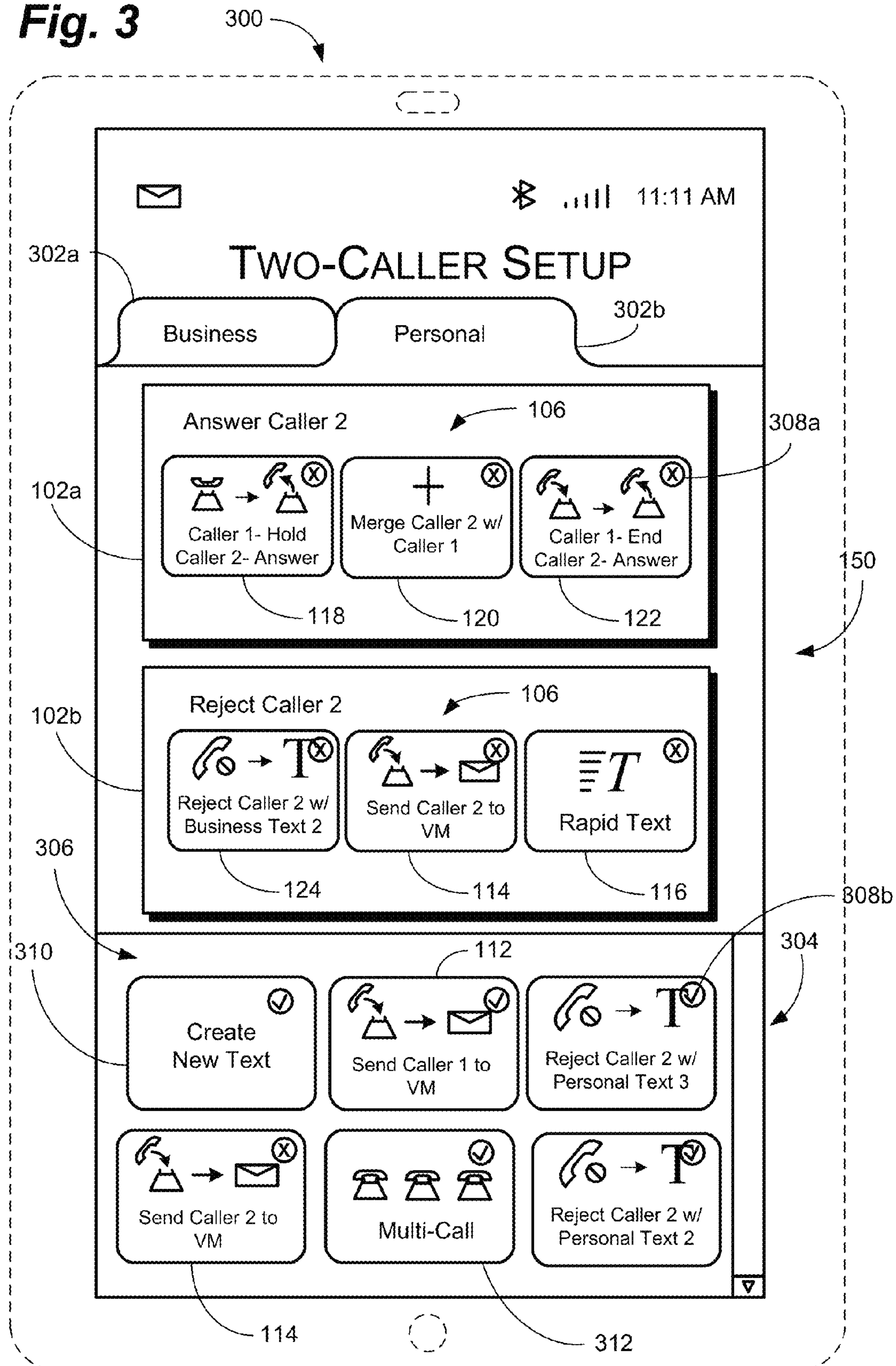
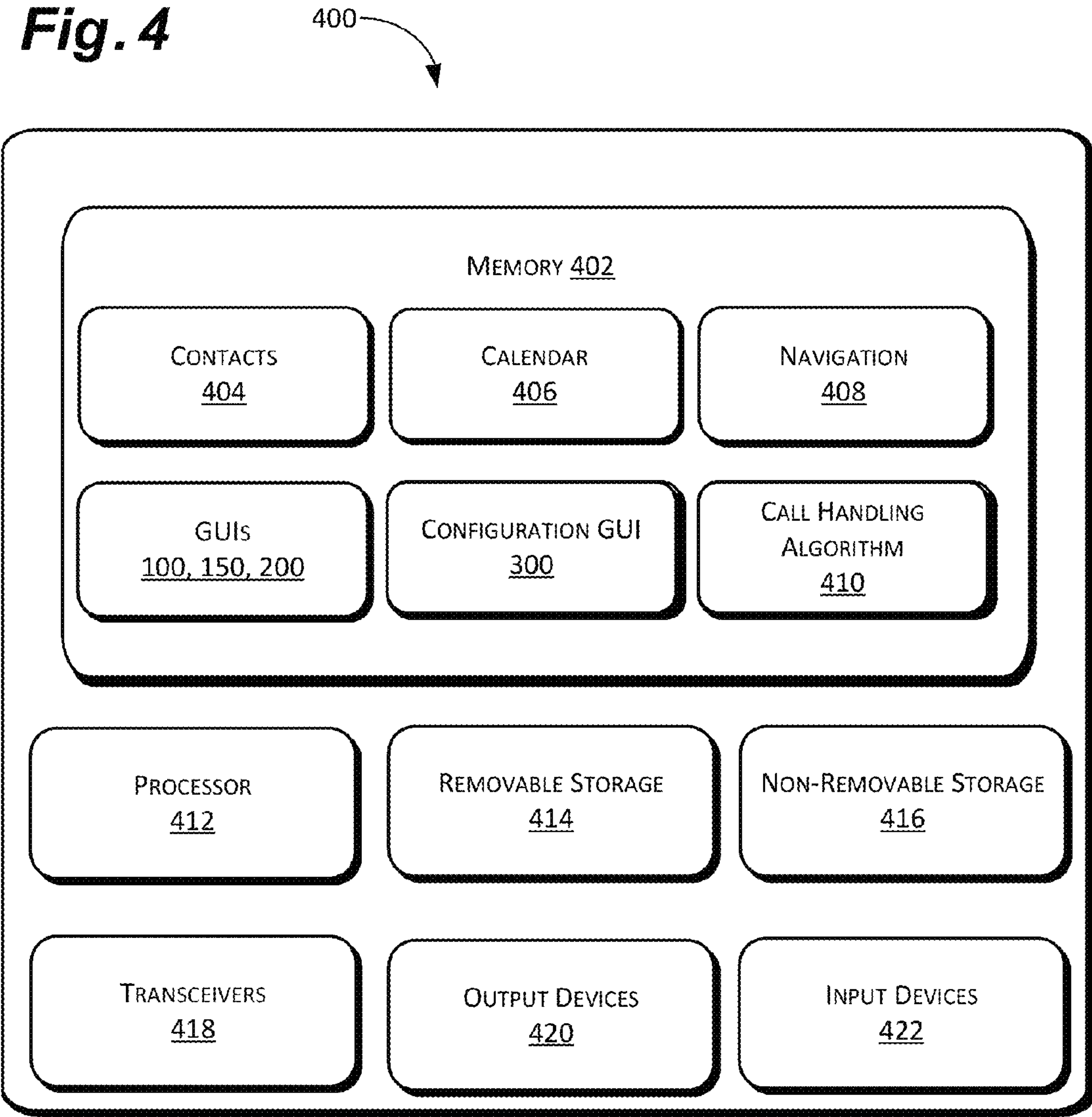
Fig. 3

Fig. 4



410



Fig. 5A

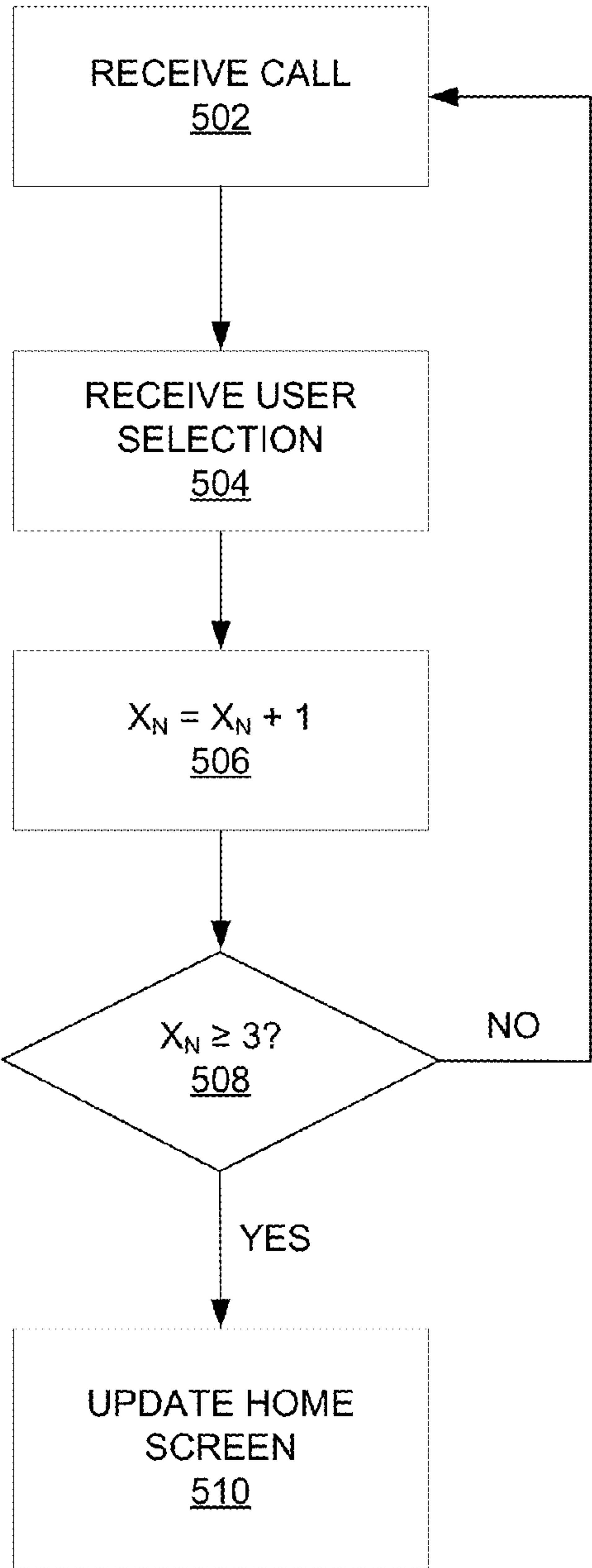


Fig. 5B

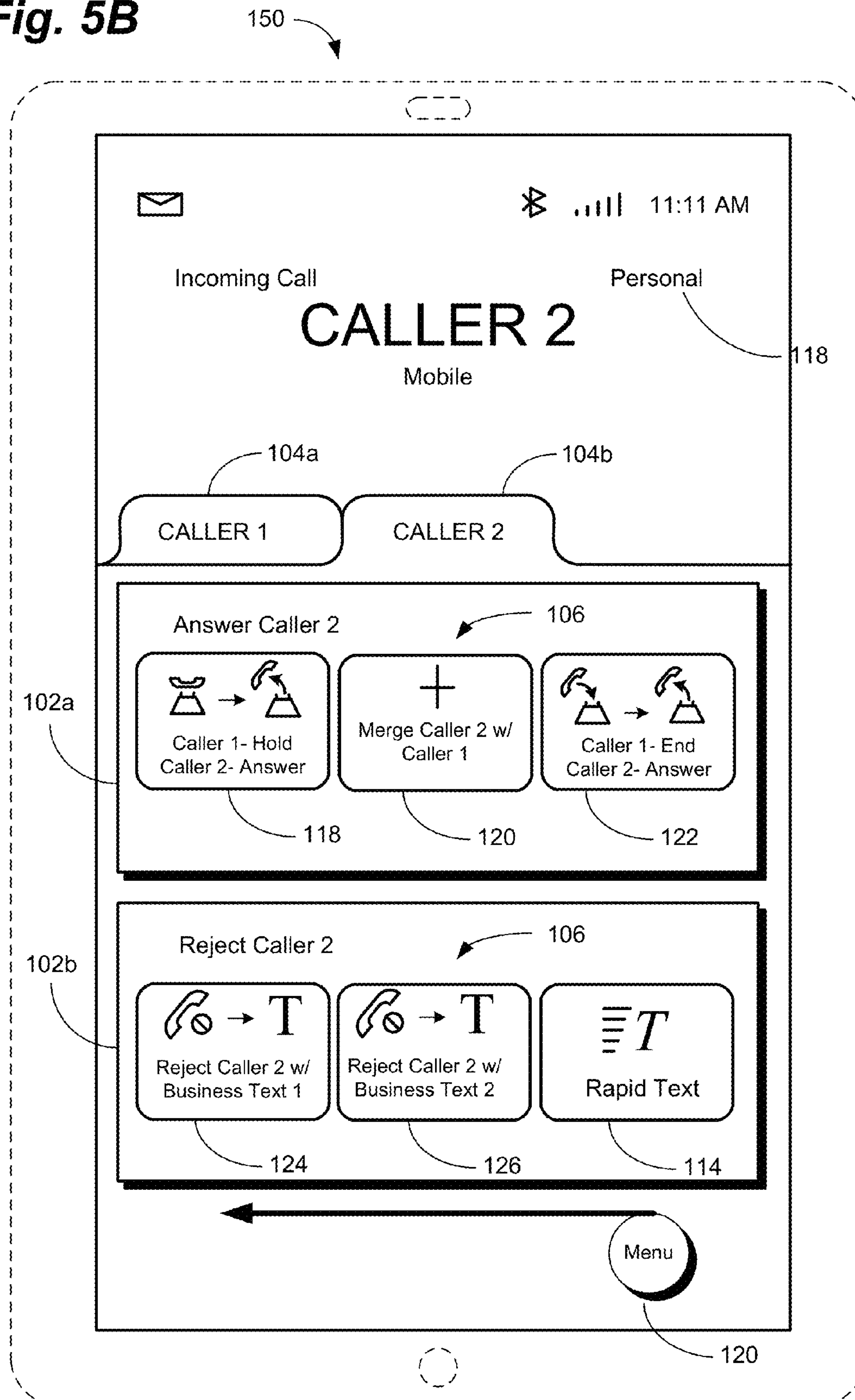


Fig. 5C

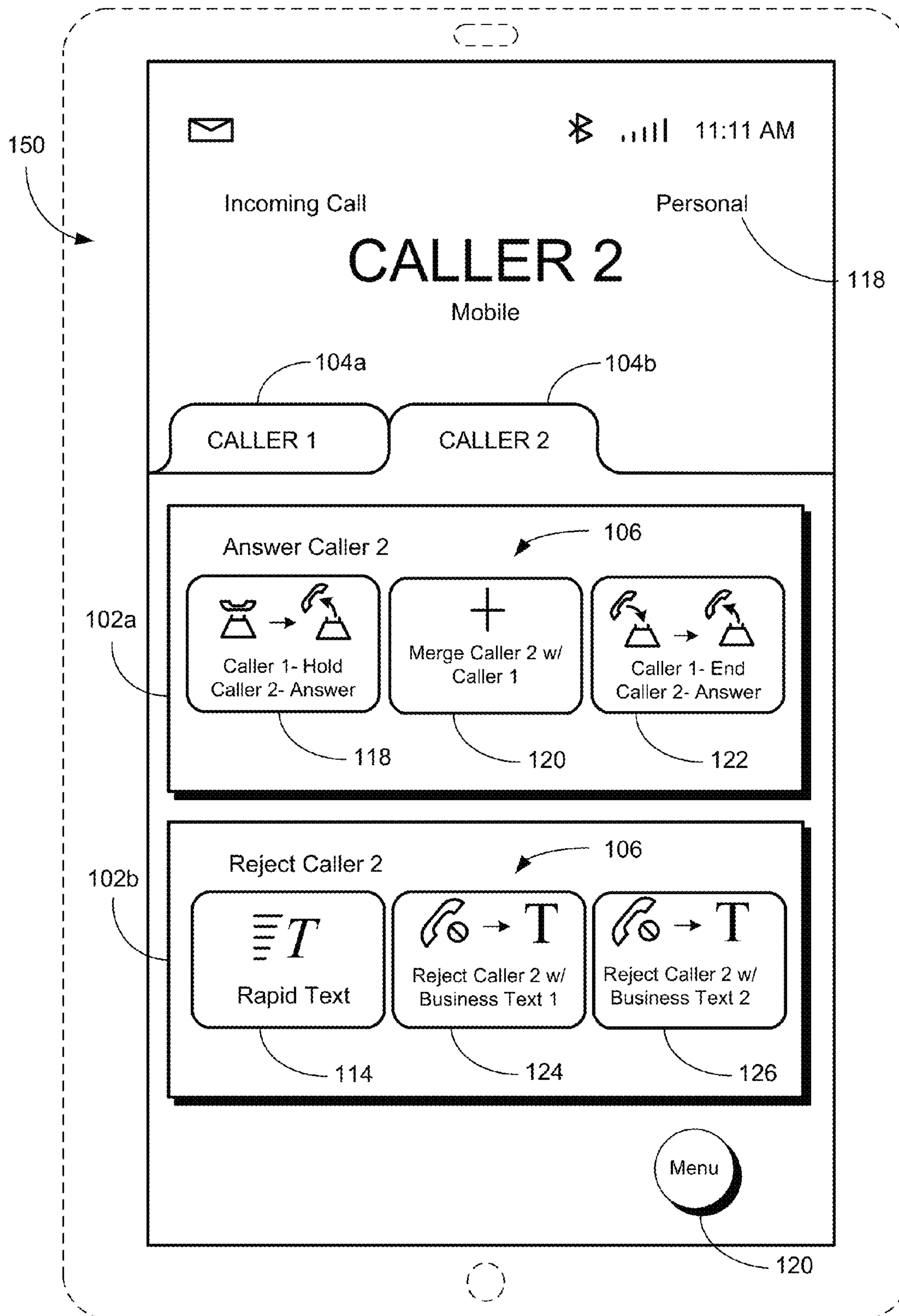


Fig. 6

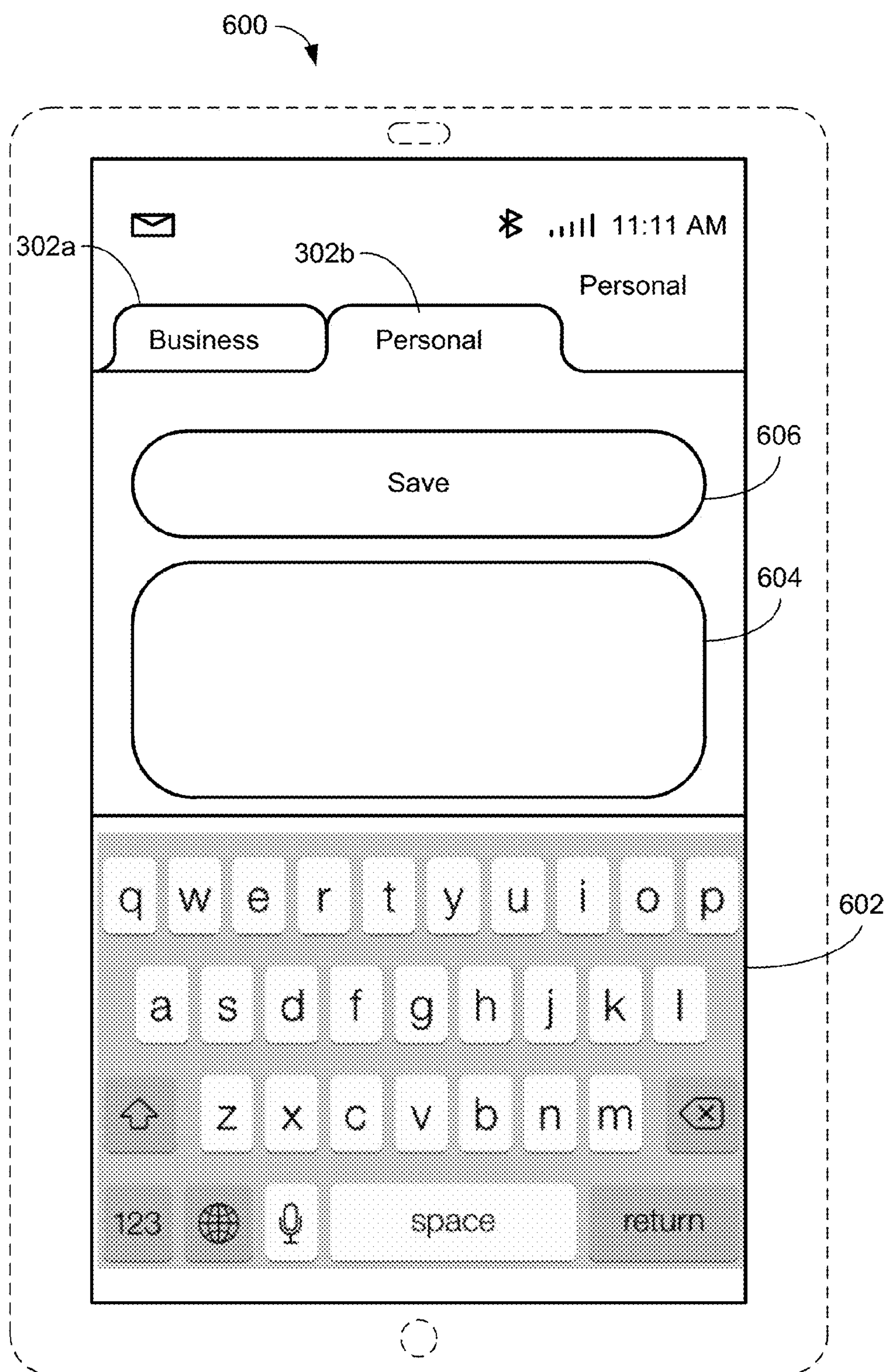
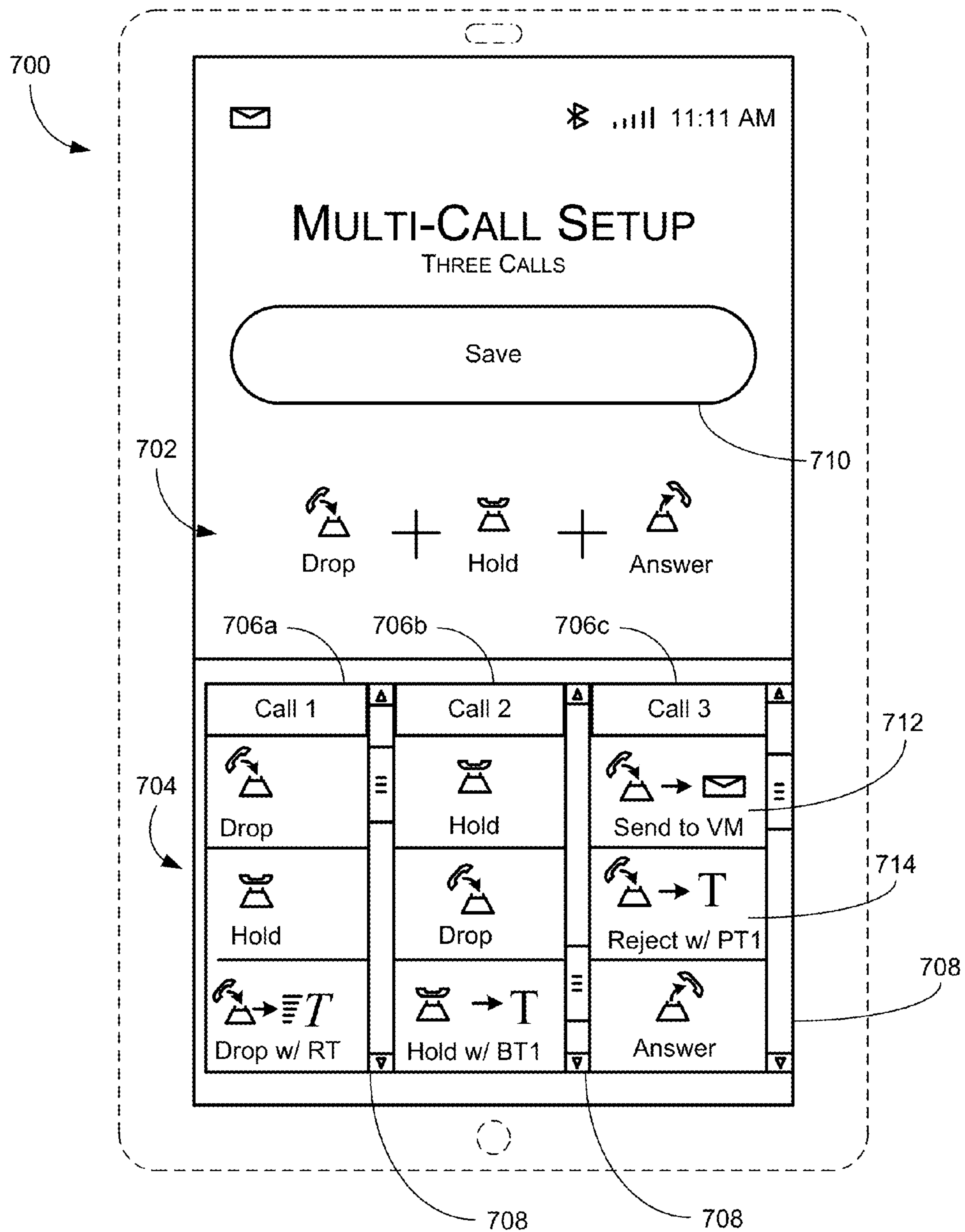


Fig. 7



SYSTEMS AND METHODS FOR IMPROVED CALL HANDLING

BACKGROUND

Computers, cellular phones, and other electronic devices are ubiquitous. The combination of the Internet, cellular technologies, and modern electronics, among other things, has created an explosion in the number and types of electronic devices available (e.g., cellular phones, smart phones, tablets, laptops, etc.). Users rely on smart phones, for example, for internet access, e-mail, navigation, and even status.

Increasingly, users rely on smart phones, tablets, and other cellular and internet connected devices as their primary method of communication. Business owners, entrepreneurs, and others may use their smart phone, for example, as their business and personal phone. This can, in turn, increase the number of calls a user receives on their smart phone and increase the incidence of receiving multiple calls at the same time.

Handling multiple calls on a mobile phone can be difficult, however. Some phones provide options for handling one or two calls, but these options are not customizable and do not provide enough options. Simply refusing a call, without some kind of an explanation to the caller, for example, may not be acceptable from a customer service standpoint.

BRIEF DESCRIPTION OF THE DRAWINGS

The detailed description is set forth with reference to the accompanying figures. In the figures, the left-most digit(s) of a reference number identifies the figure in which the reference number first appears. The use of the same reference numbers in different figures indicates similar or identical items or features.

FIG. 1A depicts a one call graphical user interface (GUI) with an incoming business call, in accordance with some examples of the present disclosure.

FIG. 1B depicts a two call GUI with an incoming business call, in accordance with some examples of the present disclosure.

FIG. 2 depicts a three call GUI with an incoming personal call, in accordance with some examples of the present disclosure.

FIG. 3 depicts a customization module for the GUIs of FIGS. 1A-2, in accordance with some examples of the present disclosure.

FIG. 4 is a component level schematic for a user equipment (UE) for use with the GUI of FIG. 1, in accordance with some examples of the present disclosure.

FIG. 5A is a flowchart depicting a method for reordering functions in the GUI according to use, in accordance with some examples of the present disclosure.

FIGS. 5B and 5C graphically depict reordering functions in the GUI according to use, in accordance with some examples of the present disclosure.

FIG. 6 depicts a text interface, in accordance with some examples of the present disclosure.

FIG. 7 depicts a multi-call interface, in accordance with some examples of the present disclosure.

DETAILED DESCRIPTION

Examples of the present disclosure relate generally to systems and methods for providing customizable graphical

user interfaces (GUI) for call handling on mobile phones, tablets, and other network (e.g., cellular or Internet) connected devices (collectively, user's equipment or UEs). The system can include multiple customizable GUIs that enable users to handle one, two, three, or more calls by accepting, rejecting, placing calls on hold, sending text replies, and other options. The system can enable the user to handle multiple calls quickly and efficiently and can enable the user to customize their responses to calls based on their preferences.

To simplify and clarify explanation, the disclosure is described herein as systems and methods for use with cellular phones. One skilled in the art will recognize, however, that the disclosure is not so limited. While the systems and methods are useful in conjunction with cellular phones and call handling associated therewith, it should be understood that the systems and methods can just as easily be used for other network connected electronic devices, such as tablets, laptops, and personal computers. The system can be used anytime efficient, customizable call handling is desired to provide the user with an enhanced experience and to enable the user to provide improved service to incoming calls.

The systems and methods described hereinafter as making up the various elements of the present disclosure are intended to be illustrative and not restrictive. Many suitable systems, methods, and configurations that would perform the same or a similar function as the systems described herein are intended to be embraced within the scope of the disclosure.

Currently, no third-generation partnership project (3GPP) standard exists for multiple call handling and GUIs associated with multiple call handling. In addition, many current GUIs provide only limited, non-customizable options with regard to handling one or two additional calls (two or three total calls, respectively). These include, for example, the ability to reject an incoming call, place a current call on hold and swap to an incoming call, and some fixed text responses. These do not enable the user to customize these responses, however, or place additional options in an easy to use and configure GUI.

A user may wish, for example, to have customized text responses readily available to reply to different types of incoming calls. In other words, if a user is on a call (or multiple calls) and another call comes in, the user must choose whether to stay on the current call and reject the incoming call, or vice-versa. If the user decides to take the incoming call, for example, it is easy enough for the user to simply tell the current caller, "I have to take this other call, let me call you right back," or other suitable explanation.

If the user decides to stay on the current call, however, it is significantly more difficult to explain to the incoming caller what is happening. Currently, the user can send the incoming call to voicemail (or just ignore it), swap to the other call and tell the incoming caller that they will call them back, or send a "canned" text message (e.g., "I'll call you in 10 min."). This type of response may not be appropriate for business calls, for example, and each user may wish to customize their choices based on their personal preferences and business needs.

If a user is on a call with a customer, for example, and a friend calls on another line, the user may wish to send a relatively informal text to the friend that says, for example, "I'm on the phone, call you right back!" If a user is on a call with a customer and another customer calls, on the other hand, the user may wish to send a more formal, or business-like, text to the incoming caller. The user may wish to send,

for example, “Thank you for your call. I am not available to take your call at the moment, but I will return your call very shortly.” Similarly, some users may wish to take certain actions, like staying on the current call and sending a text message to the incoming call, while other users may wish to take the incoming call more often. Thus being able to customize the actions that appear on the “home screen” for call handling, i.e., the screen that appears when a call is incoming, and being able to customize the actions themselves would be advantageous. It is to such systems and methods that examples of the present disclosure are primarily directed.

As shown when comparing FIGS. 1A, 1B, and 2, handling multiple calls can be more complicated than handling a single call. When attempting to handle a third incoming call, while already on two calls (FIG. 2), the combinations and permutations alone can be cumbersome. As a result, it would be helpful for the user to be able to customize call handling for one, two, three, or more calls to their personal preferences. This can enable the caller to efficiently handle calls based on whether they are business, personal, or family calls, among other things. It is to such systems and methods that examples of the present disclosure are primarily directed. As shown in FIG. 1A, the simplest use case is the handling of a single incoming call from “Caller 1.” Providing a customizable one call GUI 100, can nonetheless provide useful choices regarding how the user prefers to handle calls when they are unavailable, for example, and for business calls versus personal calls, among other things.

As shown, in this case, a call is incoming from Caller 1, while no other call is active. In this configuration, a conventional GUI may provide two or three fixed choices such as, for example, answer Caller 1, send Caller 1 to voicemail, and reject with text, where the text is a generic text. As shown, in this case, however, the user is not only provided with more options, but each option is customizable to provide more efficient call handling for that user’s needs.

The user obviously has two basic choices when it comes to Caller 1, they can answer or not answer. To this end, the one call GUI 100 can include an answer group 102a of function buttons and a reject group 102b of buttons. Thus, the user is presented with two clear groups 102 of buttons each related to either answering the incoming call or rejecting it. Each group 102 can also be customized with one or more buttons by the user for each type of call—business, personal, family, etc.

As shown when comparing FIGS. 1A, 1B, and 2, and discussed below, the GUIs 100, 150, 200 can include a tab 104 for each caller. As shown in FIG. 1A, therefore, a single tab 104a is shown for the incoming call from Caller 1. In contrast, as shown in FIG. 2, the GUI 200 can include three tabs 104a, 104b, and 104c for Caller 1, Caller 2, and Caller 3, respectively. This can enable the user to switch between callers and interfaces when desired.

As shown in FIG. 1A (which is a business call), for business contacts, the groups 102 of function buttons 106 can be geared towards how business calls are most often handled. In this case, because the user is not currently on a call, the answer group 102a may include an answer Caller 1 button 108 to answer the call as normal. Obviously, selecting the answer Caller 1 button 108 connects Caller 1 to the user and the call commences.

If the user is busy, on the other hand, or simply does not want to take the call, the user can select a function button 106 from the reject group 102b. So, for example, the user may include a pre-configured business text button 110, a send to voicemail button 112, and a rapid text button 114. As

discussed below, with reference to FIG. 2, the groups 102 may be completely different for, for example, multiple call handling, personal calls versus business calls, or from user to user.

The one call GUI 100 can include one or more pre-configured business text buttons 110. As the name implies, the pre-configured business text button 110 can enable the user to send a text message pre-configured by the user to Caller 1. Because the user is rejecting Caller 1, rather than talking to them, it can be useful to give Caller 1 an explanation, for example, rather than just sending Caller 1 to voicemail. This can include explaining why the user cannot take their call right now and/or when they will return their call, among other things.

In this business context, the user can configure the pre-configured business text button 110 to send a more formal or courteous text message suitable for business contacts—as opposed to personal contacts, which may be more casual or humorous. So, for example, the business text 1 button 110 may read, “Thank you for your call. I apologize, but I am unavailable to take your call right now. I will call you back as soon as possible.” The user can also configuration additional pre-configured business text buttons with a different, but similarly professional and/or formal text message.

In some examples, the one call GUI 100 can also include a send Caller 1 to voicemail button 112. As the name implies, this simply sends Caller 1 to voicemail and stops the user’s phone from ringing. This may be useful to enable the user to quickly silence their phone (e.g., when they are in a meeting) or to prevent Caller 1 from hanging up before leaving a message, among other things.

In some examples, the one call GUI 100 can also include a rapid text button 114. The rapid text button 114 can enable the user to send a personalized text message quickly without having to exit the one call GUI 100 or having to open the text messaging utility separately. If the pre-configured business text button 110 is inappropriate or inapplicable for a particular client, for example, or the user wished to provide Caller 1 with more specific information with the rapid text button 114. As shown in FIG. 6 and discussed below, the user can press the rapid text button 114 and type a text directly into a text interface 600 without exiting the one call GUI 100. This can enable the user to type and send a text message more quickly and efficiently. Thus, the user may type a customized message to a client he represents such as, for example, “I am in a meeting with the buyer right now. Call you right back with the new terms.”

In some examples, in addition to sending a text message, the incoming call may also be sent, or may be given the option to be sent, to voicemail. In some examples, Caller 1 can first be sent the text message and then after a predetermined amount of time, be sent to voicemail. In some examples, each text message can include information related to accessing the voicemail system. Alternatively, any or all of the text message buttons 110, 114, for example, can include a link or applet to enable Caller 1 to choose to go to voicemail after receiving the text message.

Using either the pre-configured business text button 110 or the rapid text button 114, Caller 1 has been alerted that the user is not available and why, rather than simply sending Caller 1 to voicemail. This can avoid any confusion on the caller’s part and can prevent the caller from feeling neglected. In some examples, one of the preconfigured text messages can also include a reference to a return call—e.g., “I apologize, I am temporarily indisposed. I will call you

5

back within the next 10 minutes. If you would like to be sent to voicemail, please press **1** now. Otherwise, I will return your call shortly.”

In some examples, each GUI—e.g., the one call GUI **100**, the two call GUI **150**, and the three caller GUI **200** (discussed below)—can include a call type designator **116**. The call type designator **116** can be set when the user enters the contact into their contact list and can include a number of categories. The call type designator **116** can include, for example, personal, business, colleagues, close friends, and church. In some examples, the call type designator **116** can be customizable and can include many categories to provide additional granularity to the GUIs **100**, **150**, **200**.

In some examples, each call type designator **116** can have a corresponding call handling GUI **100**, **150**, **200**. In other words, the function buttons **106** and layout of each GUI **100**, **150**, **200** can vary based on the type of incoming call. Thus, while each **100**, **150**, **200** may have similar structures (e.g., each can have two clear groups **102** of function buttons **106**), the specific function buttons **106** for each call type designator **116** can be different. In addition, based on the call type designator **116** of an incoming call and the number of active calls, the appropriate GUI **100**, **150**, **200** can automatically be selected for the call. As shown in FIG. 1, if a single call comes in from a business contact, for example, the business version of the one call GUI **100** can be automatically selected, including the most commonly used functions for a business call. Additional GUIs can be included, which include the most common functions for, for example, personal calls, church calls, or family calls, as appropriate. As discussed below with reference to FIGS. 1B and 2, the system can also enable multiple call handling, wherein each call has a different call type designator **116**.

As shown in FIG. 1B, therefore, examples of the present disclosure can comprise a GUI for handling multiple calls, in this case a two call GUI **150**. As shown, in this example, a call is incoming from Caller 2, while the user is already on a call with Caller 1. In this configuration, a conventional GUI may provide two or three fixed choices such as, for example, answer Caller 2, send Caller 2 to voicemail, and reject with text, where the text is a generic, or “canned,” text. In this case, however, the user is not only provided with more options, but each option is customizable to provide more efficient call handling for that user’s needs.

The user obviously has two basic choices when it comes to Caller 2, they can answer or not answer. To this end, the two call GUI **150** can again include the answer group **102a** of function buttons **106** and the reject group **102b** of function buttons **106**. Thus, the user is presented with two clear groups **102** of function buttons **106** each a specific version related to either answering the incoming call or rejecting it. And while in this case, both calls are from business contacts, each group **102** can also be customized by the user for each type of call—business, personal, family, etc. So, for example, if Caller 2 was a personal call, some or all of the function buttons **106** in the two call GUI **150** could be different.

As shown in FIG. 1B, for business contacts, the groups **102** can be geared towards how business calls are most often handled. So, for example, the answer group **102a** can include a hold-and-answer button **118**, a merge call button **120**, and an end-and-answer button **122**. The reject group **102b**, on the other hand, can include two different pre-configured business text buttons **110**, **124**, and the rapid text button **114**. As discussed below, with reference to FIG. 2, the

6

groups **102** may be completely different for, for example, personal calls, family calls, and business calls, among other things.

The hold-and-answer button **118**, merge call button **120**, and end-and-answer button **122** can have their usual functions. The hold-and-answer button **118** can enable the user to place Caller 1 on hold and answer Caller 2. Because the user is already on the call with Caller 1, the user can simply explain that they have another call and they will be right back. In other words, it is likely not necessary to send Caller 1 a text message or other explanation as to why they are on hold, it can simply be explained to Caller 1 by the user before switching over.

As normal, the merge call button **120** can add the incoming call (Caller 2) to the current call (Caller 1) to conduct a conference call. This may be particularly useful on business calls when multiple parties are negotiating a deal, for example, or conducting a meeting. As the name implies, the end-and-answer button **122** can end the call with Caller 1 and answer Caller 2. Again, because the user is on the call with Caller 1, he can simply say good bye to Caller 1 if their business is concluded, for example, or tell Caller 1 that he will call him right back.

The two call GUI **150** can also include one or more pre-configured business text buttons **110**, **124**. As the name implies, these pre-configured business text buttons **110**, **124** can enable the user to send a pre-configured text message to Caller 2. Because the user is rejecting Caller 2, but is not yet talking to them, it can be useful to give Caller 2 an explanation (e.g., rather than just sending Caller 2 to voicemail). This can include explaining why the user cannot take their call right now, when they will return their call, or other pertinent information.

In this business context, the user can configure these pre-configured text buttons **110**, **124** to send more formal, technical, or courteous text messages suitable for business contacts—as opposed to personal or family contacts, for example, which may be more casual or humorous. So, for example, the business text 1 button **110** may read, “Thank you for your call. I apologize, but I am unavailable to take your call right now. I will call you back as soon as possible.” The business text 2 button **124** can be configured with a different, but similarly professional and/or formal text message.

In some examples, the two call GUI **150** can also include the rapid text button **114**. As discussed above, the rapid text button **114** can enable the user to send a personalized text message quickly without having to exit the two call GUI **150**, without having to open the text messaging utility separately, and without leaving the call with Caller 1. If none of the pre-configured text buttons **110**, **124** are appropriate for a particular client, for example, or the user wishes to provide Caller 2 with specific information, the user can press the rapid text button **114** and type a text directly into the text interface **600** without exiting the two call GUI **150**. This can enable the user to type and send a text message more quickly and with little, or no, disruption to the current call. Thus, the user may type a message to a client he represents, “I am on with the call with the buyer right now. Call you right back with the new terms.”

In some examples, in addition to sending a text message, the incoming call may also be sent, or may be given the option to be sent, to voicemail. In some examples, the user can first be sent the text message and then after a predetermined amount of time, be sent to voicemail. In some examples, each text message can include information related to the voicemail system. Alternatively, any or all of the text

message buttons **110**, **114**, **124** for example, can include a link or applet to enable the user to choose to go to voicemail in addition to receiving the text message.

In either configuration, the user has been alerted that the user is not available, rather than simply sending the user to voicemail. This can avoid any confusion on the caller's part and can prevent the caller from feeling neglected. In some examples, one of the preconfigured text messages can also include a reference to a return call—e.g., “I apologize, I am temporarily indisposed. I will call you back within the next 10 minutes. If you would like to be sent to voicemail, please press **1** now. Otherwise, I will return your call shortly.”

In some examples, each GUI **100**, **150**, **200** can include a version associated with each call type designator **116**. The call type designator **116** can be set when the user enters the contact into their contact list and can include a number of categories, as discussed above. The call type designator **116** can include, for example, personal, business, colleagues, close friends, and church. In some examples, the call type designator **116** can be customizable and can include many categories to provide additional granularity to the GUIs **100**, **150**, **200**.

In some examples, each call type designator **116** can have a corresponding call handling GUI **100**, **150**, **200**. In addition, based on the call type designator **116** of an incoming call and the number of active calls, the appropriate GUI **100**, **150**, **200** can automatically be selected for the call. As shown in FIG. 1, if a single business call comes in, the business version of the one call GUI **100** can be automatically selected, including the most commonly used functions on a business call. As discussed below with reference to FIG. 2, when a personal call comes in, on the other hand, the personal version of the three call GUI **200** can automatically be selected. As discussed below with reference to FIG. 3, the system can also include a customizing GUI **300** to enable the number and selection of function buttons **106** for each GUI **100**, **150**, **200** and each call type designator **116** to be customized to the user's preferences and needs.

In some examples, the GUIs **100**, **150**, **200** can comprise any number of function buttons **106**. If the number of function buttons **106** exceeds the size of the one call GUI **100**, for example, a scrollbar, or similar, can be used to enable the user to access off-screen function buttons **106**. In other examples, for convenience and efficiency, the GUIs **100**, **150**, **200** may limit the number of function buttons **106** to that which can be displayed on a single screen. This can enable the user to access these function buttons **106** directly without accessing additional menus or scrollbars.

As shown, the GUIs **100**, **150**, **200** may limit the number of function buttons **106** to the four or six most appropriate function buttons **106**, with additional function buttons **106** available manually via a menu button **126**. The menu button **126** can enable the user to access additional menus, functions, or tabs to access additional features. In other words, if the particular function button **106** the user wished to select is not shown on the “home screen” of the GUI **100**, **150**, **200**, then the user can select the menu button **126** to access additional function buttons **106**.

Of course, some calls will come in from unknown callers, callers with blocked caller IDs, or from callers for whom a call type designator **116** has not been selected. In this case, the system can also include a “default” GUI, which can also be configurable. The default GUI can be used, and can be selected automatically by the system, when a call type designator **116** has not been designated by the user or when no GUI has been configured for a particular call type designator **116**—e.g., the user has set the call type designator

116 to “family,” but has not yet set up the family version of the GUIs **100**, **150**, **200**. In the case where the user does not know the caller, some users may want the send-to-voicemail button **210** (discussed below) to be readily available, for example. Entrepreneurs, on the other hand, may wish to give unknown callers immediate attention, as they may be potential clients or investors. In this case, the default GUI may be configured with the hold-and-answer button **118** prominently featured, for example, to enable the user to quickly switch over to the incoming call. Regardless, like the other GUIs **100**, **150**, **200**, the user can configure the default GUI to suit their needs for unknown, or uncategorized, callers.

As shown in FIG. 2, the system can also include a three call GUI **200**. In this case, the three call GUI **200** is shown for a Caller 3 that is a personal caller (e.g., a friend rather than a business associate). Thus, as discussed above, when receiving a personal call, the personal version of the three call GUI **200** can automatically be selected based on the call type designator **116** (e.g., personal). As before, the three call GUI **200** can include two groups **102** of function buttons **106**. The answer group **102a** can be focused on answering the incoming call, while the reject group **102b** can be focused on rejecting the incoming call.

In some examples, because each GUI **100**, **150**, **200** is customizable, some, or all, of the function buttons **106** on the three call GUI **200** may be different than the function buttons **106** on the one call GUI **100** or the two call GUI **150**. Similarly, the three call GUI **200** itself can have different versions, with different function buttons **106**, for different call type designators **116**. In other words, the three call GUI **200**, and indeed all the GUIs **100**, **150**, **200**, can display the same or different function buttons **106** based on the call type designator **116** of the incoming call.

Obviously, as the current number of active calls increases, call handling can become somewhat more complicated. As shown in FIG. 2, examples of the present disclosure can also comprise a three call GUI **200**. In this examples, the user is on a call with Caller 2, with Caller 1 on hold, when a third call from Caller 3 comes in. As always, the user has two overarching choices—answer Caller 3 or reject Caller 3. The three call GUI **200** can, therefore, provide several function buttons **106** in the answer group **102a** and several function buttons **106** in the reject group **102b**.

As shown, in this case, the answer group **102a** can include call handling function buttons **106** that address all three calls—i.e., the two active calls with Caller 1 and Caller 2 and the incoming call from Caller 3. To this end, the answer group **102a** can include, for example, a hold-drop-answer button **202**, a drop with RT-hold-answer button **204**, and a drop-hold with business text 1-answer button **206**.

As the name implies, the hold-drop-answer button **202** can place (or leave) Caller 1 on hold, drop the call with Caller 2, and answer the call with Caller 3. As before, because the user is currently on the call with Caller 2, the user can simply end the call with Caller 2, for example, or explain to Caller 2 that they have to take the call and they will call them back. Because the user can simply talk to Caller 2, there is less need to send them to voicemail, for example, or to send them a text.

The drop with RT-hold-answer button **204**, on the other hand, can drop Caller 1 with a rapid text, place Caller 2 on hold, and answer Caller 3. In this case, because Caller 1 is on hold, it can be useful to send a text message to Caller 1 explaining why the call is being dropped. The user may wish to send a text that says, for example, “I apologize, I have an emergency call from my daughter, I will call you back ASAP.” This provides some explanation to Caller 1 why

they have suddenly gone from being on-hold to being disconnected. As before, because the call with Caller 2 is currently active, the user can simply explain to Caller 2 that they have to take the call from Caller 3 and place them on hold to answer the call from Caller 3.

Similarly, the drop-hold with business text 1-answer button **206** can enable the user to drop Caller 1 (or send them to voicemail), place Caller 2 on hold, but provide them with “business text 1” and answer Caller 3. In this case, Caller 1 may be a friend, for example, for whom no explanation is required (e.g., the friend knows the user is busy and will call back later). Caller 2, on the other hand, can be a business associate. And, although the call with Caller 2 is active, the user may need to quickly switch over to Caller 3. This may be because Caller 3 is calling in an emergency, for example, or is simply a very important call for the user. In this manner, Caller 2 is given a text explanation (e.g., “business text 1”) as to why they were placed on hold and they user is able to immediately answer the call with Caller 3 without having to provide a rushed explanation to Caller 2. Of course, there are myriad combinations and permutations for both the two call GUI **150** and the three call GUI **200**, any of which can be created using the multi-call interface **700** discussed below with reference to FIG. 7.

The three call GUI **200** can enable the user to customize the personal function buttons **106** with function buttons **106** that are more commonly used for personal call (e.g., as opposed to a business call). As shown, this may include different function buttons **106** than on the one call GUI **100** because, for example, friends are more flexible and/or understanding, and less prone to be negatively impacted by more casual messaging and handling (e.g., simply dropping the call or send the caller to voicemail). Friends may expect to leave a voicemail during the day, for example, because they know the user is working. Customers, on the other hand, may feel as though they are not receiving good service if their calls are not answered, or at least acknowledged, immediately.

As before, the function buttons **106** in the reject group **102b** are somewhat less complicated despite the number of calls, though they can still be customized for personal or business calls. In this case, because the user is receiving a personal call, they may be somewhat less concerned with formality and courtesy. They may know, for example, that when Caller 3 (a friend) calls, the friend will not be upset if they are sent to voicemail and will simply either (1) hang up and wait for a callback or (2) leave a message.

To this end, the user can select the reject with personal text 1 button **208** to reject the call with Caller 3 and/or send Caller 3 to voicemail (or provide them with the option) and provide them with “personal text 1.” Personal text 1 can be a friendly, funny, or otherwise more informal message when compared to business text 1, for example. This enables the user to acknowledge Caller 3, yet stay on the current call with Caller 2. This can also enable the user to stop the beeping tone that indicates an incoming call (the “call-waiting” tone) and return to the call at hand.

Though only one is shown in FIG. 2, the three call GUI **200** can also comprise multiple personal text message buttons **208**, each configured with a customized message. The reject with personal text 1 button **208** may include a simple, “On another call right now. Call you right back” text, for example, or, an “I will call you after work.” text. As discussed below, the user can select additional personal text message buttons, each with a customized personal text message, using the customizing GUI **300**.

The three call GUI **200** can also include a send Caller 3 to voicemail button **210** (without text). As discussed above, this may be acceptable because Caller 3 is a friend, for example, and may even expect to be sent to voicemail during business hours. The three call GUI **200** can also include the rapid text button **114**. As before, the rapid text button **114** can enable the user to reject Caller 3 with a customized text, while staying on the call with Caller 2.

As discussed above, each GUI **100**, **150**, **200** can be personalized for the user and the call type designator **116**. Thus, the one call GUI **100** may have a personal and a business version, the two call GUI **150** may have a personal and a business version, etc. Thus, each GUI **100**, **150**, **200** may have different function buttons **106** for personal calls, business calls, family calls, etc. As shown in FIG. 3, therefore, the system can also include a customizing GUI **300** to enable the function buttons **106** and other features for each GUI **100**, **150**, **200** to be customized.

So, for example, FIG. 3 depicts the customizing GUI **300** in two-caller setup mode to enable the user to setup the two call GUI **150**. Of course, though not shown, the customizing GUI **300** can also include a setup screen for the one call GUI **100**, the three call GUI **200**, or more GUIs. The customizing GUI **300** can have a setup screen for each type of GUI **100**, **150**, **200** and can have a separate tab **302** for each call type designator **116**. As shown, the customizing GUI **300** can have a tab **302a** for customizing business calls and a tab **302b** for customizing personal calls. Of course, if there are additional call type designators **116** in use by the user, a tab **302** can be include for each additional call type designator **116** and for each GUI **100**, **150**, **200**.

The customizing GUI **300** can include the function buttons **106** currently in use on the selected tab **302b**—i.e., the function buttons **106** provided from the factory, for example, or previously configured by the user—and a customizing menu **304** including a plurality of additional function buttons **306** (i.e., in addition to, and including, the functions that are included with the GUI **150** by default) that are applicable to that particular GUI **100**, **150**, **200**. In other words, because each GUI **100**, **150**, **200** is designed to handle a different number of calls, some of the functions buttons **106**, and particularly those for answering calls, are different. In some examples, rather than customizing each GUI **100**, **150**, **200**, the user can simply use the GUI **100**, **150**, **200** with the function buttons **106** that are chosen by default from the manufacturer or service provider. In other cases, the user can customize one, or all, of the GUIs **100**, **150**, **200** and tabs **302** to suit their personal preferences.

In some examples, the function buttons **106**, **306** can be added to, or removed from, to the selected GUI **150** using a selector button **308** or similar. The user can remove existing function buttons **106** by selecting a remove button **308a**—shown as an “X” button—by way of examples. The user can also add additional function buttons **106** to the GUI **200** by selecting the appropriate add button **308b**—shown as a “checkmark” button—by way of examples.

Of course, the design, shape, and locations of the selector buttons **308** is somewhat arbitrary. Instead of selector buttons **308**, the customizing GUI **300** could provide drag-and-drop functionality. In this configuration, the user can simply drag an existing function button **106** off the GUI **150** and into the customizing menu **304** to remove it. Similarly, the user can drag an additional function button **306** from the customizing menu **304** to the GUI **150** to add it. The customizing menu **304** could also comprise an “add” and

11

“remove” drop down menu, checklists, buttons, or other means to enable the user to add and remove function buttons **106**, **306** as desired.

In some examples, the customizing GUI **300** can also include a create new text button **310** and a new multi-call button **312**. As discussed below with reference to FIG. 6, the create new text button **310** can enable the user to create new, pre-configured personal **208** or business **110**, **124** text buttons. As discussed below with respect to FIG. 7, the new multi-call button **312** can enable the user to configure new two- or three-way call handling buttons for use with the two call GUI **150** or the three call GUI **200**, respectively.

As shown in FIG. 4, any or all of the GUIs **100**, **150**, **200**, **300** can be implemented on a variety of electronic devices, such as cell phones, smart phones, tablet computers, and laptops (collectively UE **400**). The UE **400** can comprise a number of components to enable the GUIs **100**, **150**, **200** and customization GUI **300**, among other things, to perform the above-mentioned functions. As discussed below, the UE **400** can comprise memory **402** including many common features such as, for example, the user’s contacts **404**, calendar **406**, and navigation software **408**. In addition, the memory **402** can also include the GUIs **100**, **150**, **200**, the customization GUI **300**, and a call-handling algorithm **410**. The UE **400** can also include one or more processor(s) **412**, removable storage **414**, non-removable storage **416**, transceivers **418**, output device(s) **420**, and input device(s) **422**. The UE **400** may additionally contain a policy engine to receive, create, transmit, and manage the various messages and commands. In some examples, some or all of the functions associated with the GUIs, such as GUIs **100**, **150**, **200** and the customization GUI **300**, can be handling by a remote server, or other remote network entity.

In various implementations, the memory **402** can be volatile (such as random access memory (RAM)), non-volatile (such as read only memory (ROM), flash memory, etc.), or some combination of the two. The memory **402** can also comprise contacts **404**. The contacts **404** can include names, numbers, addresses, and other information about the user’s business and personal acquaintances, among other things. As mentioned above, in some examples, the contacts **404** can also comprise a call type designator **116** to enable the GUIs **100**, **150**, **200** to select an appropriate tab **302** for an incoming call.

In some examples, the memory **402** can also include a calendar, or other software, to enable the user to track appointments and calls, schedule meetings, and provide similar functions. In some examples, the memory **402** can also comprise navigation software **408**. Of course, the UE **400** can also include other software such as, for example, e-mail, text messaging, social media, and utilities (e.g., calculators, clocks, compasses, etc.).

In some examples, the memory **402** can also comprise a call-handling algorithm **410**. As discussed below, with respect to FIG. 5, the call-handling algorithm **410** can update the GUI **100**, **150**, **200** automatically based on the previous and/or recent actions of the user during calls. If the user repeatedly uses one function button **106** during business calls, for example, then the call-handling algorithm **410** can update the appropriate GUI **100**, **150**, **200** to include this function button **106**, or to include this function more prominently (e.g., the call-handling algorithm **410** can move this function button **106** to the top of the list or the left of the screen).

The UE **400** may also include additional data storage devices (removable and/or non-removable) such as, for example, magnetic disks, optical disks, or tape. Such addi-

12

tional storage is illustrated in FIG. 4 by removable storage **414** and non-removable storage **416**. The removable storage **414** and non-removable storage **416** can store the various programs **404**, **406**, **408** and algorithms **410** to enable the UE **400** to be fully or partially configured and to enable the GUIs **100**, **150**, **200** and customizing GUI **300** to present welcome screens, setup menus, and other functions to the user via the GUI **100**, **150**, **200**, customizing GUI **300**, operating system (OS), and other programs and functions.

Non-transitory computer-readable media may include volatile and nonvolatile, removable and non-removable tangible, physical media implemented in technology for storage of information, such as computer readable instructions, data structures, program modules, or other data. The memory **402**, removable storage **414**, and non-removable storage **416** are all examples of non-transitory computer-readable media. Non-transitory computer-readable media include, but are not limited to, RAM, ROM, electronically erasable ROM (EEPROM), flash memory or other memory technology, compact disc ROM (CD-ROM), digital versatile disks (DVD) or other optical storage, magnetic cassettes, magnetic tape, magnetic disk storage or other magnetic storage devices, or any other tangible, physical medium which can be used to store the desired information and which can be accessed by the UE **400**. Any such non-transitory computer-readable media may be part of the UE **400** or may be a separate database, databank, or remote server.

In some implementations, the transceivers **418** include any sort of transceivers known in the art. In some examples, the transceivers **418** can include wireless modem(s) to facilitate wireless connectivity with the other UE **400**, the Internet, and/or an intranet. Further, the transceivers **418** may include a radio transceiver that performs the function of transmitting and receiving radio frequency communications via an antenna (e.g., WiFi or Bluetooth®). In other examples, the transceivers **418** may include wired communication components, such as a wired modem or Ethernet port, for communicating with the other UE **400** or the provider’s cellular or Internet-based network.

In some implementations, the output devices **420** include any sort of output devices known in the art, such as a display (e.g., a liquid crystal or thin-film transistor (TFT) display), a touchscreen display, speakers, a vibrating mechanism, or a tactile feedback mechanism. In some examples, the output devices can play various sounds based on, for example, whether the UE is connected to a network, the type of call being received, the number of active calls, etc. Output devices **420** also include ports for one or more peripheral devices, such as headphones, peripheral speakers, or a peripheral display.

In various implementations, output devices **420** include any sort of input devices known in the art. For example, output devices **420** may include a camera, a microphone, a keyboard/keypad, or a touch-sensitive display. A keyboard/keypad may be a standard push button alphanumeric, multi-key keyboard (such as a conventional QWERTY keyboard), a touchscreen, or one or more other types of keys or buttons, and may also include a joystick, wheel, and/or designated navigation buttons, or the like.

As shown in FIGS. 5A-5C and discussed above, examples of the present disclosure can also comprise a call handling algorithm **410** for updating the GUIs **100**, **150**, **200** according to the user’s past preferences. In other words, in some examples, if a user repeatedly uses the send Caller 1 to voicemail button **112** during business calls, for example, this button can be moved to the upper row of the GUIs **100**, **150**, **200** or the left side of the reject group **102b**, for example, to

13

be more readily accessible. Similarly, if a user is forced to repeatedly use the menu button **126** to retrieve a function button **106** not included in the current configuration of the GUIs **100**, **150**, **200**, the call handling algorithm **410** can update the GUIs **100**, **150**, **200** automatically after a prede-

termined number of uses. As shown in FIG. 5A, at **502**, therefore, the user can receive a call. As mentioned above, each contact can be identified by the user when stored in memory by using a call type designator **116**. As a result, when the call appears on the screen, the correct version of the GUI **100**, **150**, **200** can automatically be selected. If a third call is received from a friend as shown in FIG. 2, for example, the personal version of the three call GUI **200** can be activated with the function buttons **106** preconfigured by the user for personal calls in that GUI **200**.

At **504**, the GUI **100**, **150**, **200** can then receive the user's selection for a function button **106** (e.g., they touch a button on the touchscreen of the UE **400**). This can include function buttons **106** that are already on the GUI **100**, **150**, **200**, or function buttons **106** that are not directly on screen, but are accessed using, for example, the aforementioned menu button **126** (or the OS of the UE **400**). As discussed below, if the GUI **100**, **150**, **200** already contains the most frequently used features, the no action is necessary. If, on the other hand, the function buttons **106** should be changed, or reordered, based on the user's inputs, appropriate action can be taken.

At **506**, the call handling algorithm **410** can track how many times each function button **106** has been accessed. As a result, a counter, X_N , can be employed for each function button **106**. In other words, a first function button **106a** can use X_1 , a second function button **106b** can use X_2 , and so on. Each time the user accesses a particular function button **106**, therefore, the corresponding counter can be incremented by one. The call handling algorithm **410** can then set a threshold at which the GUIs **100**, **150**, **200** will be updated.

At **508**, the call handling algorithm **410** can determine if X_N has reached, or crossed, the threshold. In this case, if $X_N \geq 3$, meaning the function has been used three times, then the threshold has been crossed and the decision tree returns a "yes." If $X_N \leq 3$, on the other hand, the end result is that X_N is incremented by one, but no action is taken. In this case, the call handling algorithm **410** merely reverts to **502**, when a new call is received. Of course, the threshold is arbitrary and can be different, or can be changed by the user.

In some examples, the user can set the call handling algorithm **410** to update a particular GUI **100**, **150**, **200** to always display the function button **106** that was last used in the left, middle, or right (whichever the user prefers) of the group **102**, but leave the remaining functions as configured by the user. In other examples, the user can set the call handling algorithm **410** to update a particular GUI **100**, **150**, **200** to always display the last function button **106** that was used three times in the left, middle, or right of the group **102**, but leave the remaining functions as configured by the user. In still other examples, the call handling algorithm **410** can maintain a running list of function button **106** used and update some, or all, of the functions on the tab **302** to be displayed in each group **102** in descending (or ascending) order of frequency of use. In this manner, the most frequently used function button **106** can be displayed in the most prominent location (e.g., in the middle of the tab, or in the upper left of the GUI **100**, **150**, **200**), followed by the second most frequently used function button **106**, etc. In still other examples, the call handling algorithm **410** can simply display the function buttons **106** in the order of last use. In

14

other words, the last function button **106** used can be in the upper, left hand corner, the second to last function button **106** used can be in the upper middle position, and so on. Of course, what is deemed a "prominent" position within the GUI **100**, **150**, **200** can vary by user, location (e.g., whether the local language reads from left-to-right, up-and-down), and other factors; and is thus, somewhat arbitrary.

At **510**, if the threshold has been met, on the other hand, then the GUI **100**, **150**, **200** can be updated. As mentioned above, if a particular function button **106** has been used the last three times or three times in a row, for example, then that function button **106** can be repositioned on the GUI **100**, **150**, **200**. Alternatively, if a particular function button **106** has been used more than any other function button **106** on the GUI **100**, **150**, **200**, then that function button **106** can be placed in a prominent position on the GUI **100**, **150**, **200**, or in the group **102**, to provide easy access. Both the threshold and the action can be customized by, for example, the UE manufacturer, the OS, or the user.

As shown in FIG. 5B, for example, if the user repeatedly uses the rapid text button **114** when receiving personal calls, then the rapid text button **114** can be relocated to a more prominent position in the GUI **150**. In some examples, as shown in FIGS. 5B and 5C, the rapid text button **114** can be moved to the far left of the reject group **102b** on the GUI **150**. In some examples, the remaining function buttons **124**, **126** can be moved to the right to complete the reconfiguration. Of course, if the function button **106** is not currently among the function buttons **106** on the homepage of the GUI **150** (e.g., it has been repeatedly selected using the menu button **126**), then one of the existing function buttons **106** can be removed, or "demoted," from the GUI **150**.

FIG. 5A is a flow diagram, illustrated by FIGS. 5B and 5C, of example processes discussed as a collection of blocks in a logical flow graph, which represent a sequence of operations that can be implemented in hardware, software, or a combination thereof. In the context of software, the blocks represent computer-executable instructions stored on one or more computer-readable storage media that, when executed by one or more processors, perform the recited operations. Generally, computer-executable instructions include routines, programs, objects, components, data structures, and the like that perform particular functions or implement particular abstract data types. The order in which the operations are described is not intended to be construed as a limitation, and any number of the described blocks can be combined in any order and/or in parallel to implement the processes.

As shown in FIG. 6, the GUIs **100**, **150**, **200** can enable both the number and content of the business text buttons **110**, **124** and personal text buttons **208** to be configured and updated. If the user selects the create new text button **310** on the customization GUI **300**, therefore, a text interface **600** can open to enable the user to enter a new preconfigured text message. The text interface **600** can include a keyboard **602** to enable the user to enter text, numbers, symbols, emoji, and other data. In some examples, the keyboard **602** can comprise a virtual keyboard on a touchscreen device. In other examples, the keyboard **602** can also include text-recognition to enable the user to enter data simply by speaking.

The text interface **600** can also include a text box **604** to show what is being entered and enable corrections, as necessary. The text box **604** can display text, numbers, symbols, emoji, and other data as it is being typed. In some examples, such as on a touchscreen device, the text box **604** can also enable data to be selected, copied, and pasted.

15

The text interface **600** can also include a text save button **606**. When the user has entered the desired text and/or data, the user can select the text save button **606**. In some examples, the text save button **606** can save the entered text message as a personal, business, or other type of text based on the tab **302** selected when the user pressed the create new text button **310**. In other words, in FIG. 6, because the personal tab **302b** is selected, and the user is configuring the two call GUI **150**, the text message can be saved as a personal text message button (e.g., reject with personal text 1 button **208**) by default. In other examples, the text save button **606** can invoke a save dialog that enables the user to select to which GUI **100**, **150**, **200** and call type designator **116** the message should be saved.

Similarly, the text interface **600** can assign the text message a number or address—e.g., reject with personal text 1 button **208**, first business text button, second business text button, etc. In some examples, the number can be assigned based on the lowest available slot. If the current configuration of the GUIs **100**, **150**, **200** includes the reject with personal text 1 button **208**, for example, then a subsequently entered personal text can be assigned to be the second personal text. The text messages can also be assigned absolute numbers or labeled in any other logical manner. In some examples, the save dialog can enable the user to name the entered text message, similar to naming a file on save in many OSs.

As shown in FIG. 7, examples of the present disclosure can also comprise a multi-call interface **700** for configuring multiple call handling. Thus, if a user selects the new multi-call button **312** in the customizing GUI **300**, the user can create a new two- or three-caller multi-call button **702** for use with the two call GUI **150** or three call GUI **200**, respectively. As shown, the multi-call interface **700** can enable the user to configure multiple actions **704** for two or more calls to be incorporated into a custom multi-call button **702**. In this manner, the user can customize multi-call handling to their personal preferences for each GUI **150**, **200** and each call type designator **116**. The multi-call interface **700** for creating a new three-call multi-call button **702** for the three call GUI **200** is shown. Of course, the multi-call interface **700** can also include a GUI for creating new two-call function buttons, which merely reduces the number of columns **706** of actions **704** from three to two (as discussed below).

The multi-call interface **700** can include a plurality of actions **704** to enable new multi-call buttons **702** to be created and saved for each call in a multi-call event. The user can simply choose an action **704** from each column **706** to create a new multi-call **702**. So, for example, to create a new three-call button **702** (as shown), the user can select an action **704** from the first column **706a**, the second column **706b**, and the third column **706c**. As the user selected each action **704**, the multi-call button **702** can be updated and displayed in the multi-call interface **700**. In some examples, each column **706** can include a slider **708**, or similar, to enable the user to scroll through all of the actions **704** in each column **706**. In this manner, the user can create a new multi-call button **702** with virtually any combination or permutation of actions **704**.

When the user has configured the multi-call button **702** as desired, the user can select the function save button **710**. The multi-call interface **700** can then create the new multi-call button **702**, which, in this case, can be added to the customizing menu **304** for the three call GUI **200**. As before, in some examples, the multi-call interface **700** can simply save the multi-call button **702** with the next available, or lowest,

16

naming convention—e.g., “multi-call function 3.” In other examples, the multi-call interface **700** can include a dialog box to enable the user to name the new multi-call button **702** (e.g., “Important Business Calls”).

The multi-call interface **700** can enable the user to customize the GUIs **150**, **200** further based on the user’s needs. As discussed above with reference to FIG. 2, in a three-call scenario, for example, the user may not need a send to voicemail action **712** or a reject with personal text 1 action **714** for Caller 2 because that this the current call. In other words, if the user is on Caller 2 and a more important call comes in from Caller 3 (e.g., an emergency or a more important business call), the user can simply explain the situation to the caller to Caller 2 prior to hanging up.

In some examples, therefore, each column **706** of the multi-call interface **700** can include only those actions **704** relevant to a particular caller (e.g., Caller 1 vs. Caller 2 vs. Caller 3). In other examples, to simplify the multi-call interface **700**, all actions **704** can simply be listed in each column **706**, and the user can choose the appropriate actions **704** for each caller. In either case, the user can customize the multi-call function **702** by selecting different combinations and permutations of actions **704** from each column **706** to serve different needs for each call.

Of course, the multi-call interface **700** can also include facilities for creating new multi-call buttons for two calls for use with the two call GUI **150**. In this configuration, the multi-call interface **700** can be substantially the same, but may only include two columns **706** of actions **704**. This can enable the user to customize the multi-call buttons available on the two call GUI **150**.

While several possible examples are disclosed above, examples of the present disclosure are not so limited. For instance, while a systems and methods for use with various electronic equipment has been disclosed, the system could be used on electronic equipment not mentioned, or other types of equipment without departing from the spirit of the disclosure. In addition, the location and configuration used for various features of examples of the present disclosure such as, for example, the order of steps, the layouts of the GUIs **100**, **150**, **200** or customizing GUI **300**, can be varied according to a particular device, touchscreen, or OS that requires a slight variation due to, for example, the size or construction of the device or display, power or battery constraints, or accessibility concerns. Such changes are intended to be embraced within the scope of this disclosure.

The specific configurations, method steps, and the size and shape of various elements can be varied according to particular design specifications or constraints requiring a device, system, or method constructed according to the principles of this disclosure. Such changes are intended to be embraced within the scope of this disclosure. The presently disclosed examples, therefore, are considered in all respects to be illustrative and not restrictive. The scope of the disclosure is indicated by the appended claims, rather than the foregoing description, and all changes that come within the meaning and range of equivalents thereof are intended to be embraced therein.

What is claimed is:

1. A system to handle multiple calls on a user equipment (UE), the system comprising:
 - a plurality of graphical user interfaces (GUIs), each GUI associated with (1) a predetermined number of callers and (2) a predetermined call type designator, each of the plurality of GUIs comprising:

17

an answer group comprising a plurality of function buttons associated with answering an incoming call; and
 a reject group comprising a plurality of function buttons associated with rejecting the incoming call;
 wherein the system automatically selects a GUI from the plurality of GUIs based at least in part on a current number of active calls and the call type designator of the incoming call.

2. The system of claim 1, wherein at least one function button of the plurality of function buttons in the reject group comprises a reject with pre-configured text button to reject the incoming call with a pre-configured text message.

3. The system of claim 2, wherein the pre-configured text message comprises a personal text message or a business text message.

4. The system of claim 1, further comprising a menu button displayed on each of the plurality of GUIs to enable one or more function buttons not displayed on a homepage of each respective GUI to be accessed by a user.

5. The system of claim 1, wherein at least one function button of the plurality of function buttons in the reject group comprises a rapid text button to reject the incoming call with a customized text message created contemporaneously with the rejection of the incoming call.

6. The system of claim 1, wherein the incoming call comprises a second or third active call; and
 wherein at least one function button of the plurality of function buttons in the answer group comprises a multi-call button including two or more actions associated with answering or rejecting the second or third active call.

7. An electronic device comprising:
 a display to display at least a plurality of function buttons associated with a plurality of call-handling actions, the plurality of function buttons arranged in a first configuration;
 one or more input devices to receive inputs from a user;
 a transceiver to receive a call from a caller;
 one or more processors in communication with at least the display and the one or input devices; and
 memory storing computer-executable instructions that, when executed, cause the one or more processors to perform acts to:
 determine that the call has been received by the transceiver of the electronic device;
 receive a signal associated with a selection of a first function button of the plurality of function buttons;
 increment a counter associated with the first function button by one;
 determine that the counter is equal to, or greater than a threshold; and
 cause the display to reconfigure the plurality of function buttons in a second configuration in response to the threshold being met.

8. The device of claim 7, wherein causing the display to reconfigure to display the plurality of function buttons in a second configuration comprises displaying the first function button in an upper, left hand corner of the display.

9. The device of claim 7, wherein causing the display to reconfigure to display the plurality of function buttons in a second configuration comprises displaying the first button in a left side of an answer group or a reject group.

10. The device of claim 7, wherein causing the display to reconfigure to display the plurality of function buttons in a second configuration comprises displaying the plurality of function buttons in descending order of frequency of use.

18

11. The device of claim 7, wherein determining that the counter is equal to, or greater than a threshold comprises determining that the counter is equal to or greater than three.

12. A method for creating a customizable graphical user interface (GUI) for call handling, the method comprising:
 receiving a plurality of contacts from a user at an input of a user equipment (UE), each contact including at least a call type designator;
 displaying a first tab on a display of the UE for a first call type designator;
 displaying a second tab on the display of the UE for a second call type designator;
 receiving a selection of a first group of function buttons for the first tab at an input of the UE;
 receiving a selection of a second group of function buttons for the second tab from the user at an input of the UE;
 displaying a first group of function buttons on the first tab on the display; and
 displaying a second group of function buttons on the second tab on the display.

13. The method of claim 12, wherein the first group and the second group contain at least one different function button.

14. The method of claim 12, further comprising:
 receiving, at an input of the UE, a signal associated with a selection of a customize button on the first tab;
 displaying, on the display, a customizing menu comprising third group of function buttons;
 receiving, at an input of the UE, a signal associated with a selection of a third group of function buttons for the first tab; and
 displaying a fourth group of function buttons on the first tab on the display;
 wherein the fourth group of function buttons comprises one or more function buttons from the first group and one or more function buttons from the second group.

15. The method of claim 14, further comprising:
 receiving, at an input of the UE, a signal associated with the selection of a create new text button;
 receiving, from the input of the UE, text associated with a customized text message;
 receiving, at the input of the UE, a selection of a save button; and
 adding a new text message function button to the fourth group of function buttons.

16. The method of claim 14, further comprising:
 receiving, at an input of the UE, a selection of a create multi-call function button;
 receiving, at the input of the UE, a signal associated with a selection of a first action for a first call of a multi-call;
 receiving, at the input of the UE, a signal associated with a selection of a second action for a second call of the multi-call;
 receiving, at the input of the UE, a signal associated with a selection of a save button; and
 adding a new multi-call function button to the fourth group of function buttons.

17. The method of claim 16, further comprising:
 receiving, at the input of the UE, a selection of a third action for a third call of a multi-call prior to receiving the signal associated with the selection of the save button;
 wherein the new multi-call function button includes the third action.

18. The method of claim 17, wherein the first function, the second function, and the third function are different functions.

19. The method of claim 12, wherein the first call type designator is associated with personal calls; and
wherein the second call type designator is associated with business calls.

20. The method of claim 12, wherein the first tab and the second tab each comprise an answer group of function buttons and a reject group of function buttons.

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